

NECTARINE TREE NAMED 'P.F. 11 NECTARINE'

BOTANICAL CLASSIFICATION

Prunus Persica

ORIGIN OF VARIETY

The new nectarine tree {hereinafter referred to as the 'P.F. 11 Nectarine tree'} was originated by Paul Friday in the experimental orchard, which is maintained for the purposes of breeding peach trees, at Paul Friday Farms Inc., located in Coloma, Michigan. Coloma is located in the southwest section of Michigan.

In an ongoing mass selection breeding program, superior seedlings of unrecorded parentage are maintained as seed sources for the production of seeds which are collected and planted in mass. The seeds producing parent trees are maintained solely as proprietary trees for breeding purposes and have not been released from the experimental orchard, where such trees can be evaluated for their adaptability to local and regional growing conditions. Seeds resulting from open pollination of the trees in the experimental orchard are regularly planted in mass to produce new populations of seedlings which are cultured and monitored to maturity. Trees with superior attributes are retained for further observation and testing, and contribute seeds to advancing generations of new populations of seedlings.

The tree of this application, 'P.F. 11 Nectarine', was a single plant from one such a seedling population, and was based on the numerous superior genetic attributes of this tree which are described in the botanical description to follow. While not comprehensive, the details of the botanical description to follow are believed to be a reasonably complete botanical description of the tree of this disclosure.

ASEXUAL REPRODUCTION OF THE VARIETY

The new and distinct variety of nectarine tree was asexually propagated by budding as performed in the experimental orchard of Paul Friday Farms Inc., located in Coloma, Michigan. The asexual propagation demonstrates that such reproduction of the characteristics of the tree are consistent and are established and transmitted through succeeding propagation.

SUMMARY OF THE VARIETY

The new and distinct variety of nectarine tree is of moderate upright growth and a regular and productive bearer of nectarines. The blossoms are characterized by being contracted or partially spread when in full bloom.

The blossoms of the present nectarine tree at full bloom may be characterized as being showy. More specifically, the blossoms of the present nectarine tree have angularly spaced five-blossom petals projecting upwardly at an inclined angle so as to form a blossom having a diameter of about 1-1/2" measured across the blossoms. The typical showy blossom as exemplified for example by the "Loring" (non-patented) peach has five (5) radically extending and angularity spaced petals projecting upwardly at a relatively steep inclined angle so that the diametrical measurement across the outer edges of the petals is also about 1-1/2".

The flesh of the fruit of the present nectarine tree is firm and is yellow with a minimum of red around the pit.

The skin is smooth and is of dark red color over almost 100 percent (100%) of its surface at full maturity. The fruit is large with an average diameter of 2-1/2".

It is noteworthy that the fruit of this tree is further characterized as having smooth, gently rounded cheeks at the blossom end of the fruit. These protrude to form fruit surfaces higher than the blossom point. This characteristic reduces fruit damage in harvest, shipping and storage, by reducing the exposure of and damage to the apical blossom protrusion in handling. Thus breaching of the skin and formation of an entry point for microorganisms which cause rot in many other commercially important nectarines varieties harvested in the same production period is avoided in this fruit.

The fruit has a firm flesh and may be described as resilient to the extent that the flesh is yieldable and restorable to its original state when subjected to impact forces, which may cause permanent deformities in nectarines of the commercial varieties. The firmness of the fruit facilitates handling and packaging of the nectarines without damaging the same for shipment. This results in less spoilage and also increases the shelf life.

BRIEF DESCRIPTION OF THE PHOTOGRAPHS

The accompanying photographic illustrations of the new variety show the following:

The top photograph depicts well-rounded fruit showing an unpronounced suture and a well-rounded blossom end. One specimen of the fruit is bisected at a ninety-degree angle to the plane of the suture with the stone retained in half showing its freestone characteristic and clear yellow flesh and a minimum of red around the pit. A tape measure is present indicating the large size of the fruit.

The bottom photograph depicts leaves of medium length, and width, having notably very fine serrated margins. A tape measure is present, demonstrating the medium size of the leaves.

DESCRIPTION OF VARIETY

The detailed botanical description of the foliage and fruit of the new variety of nectarine tree is based upon observations of the specimens grown at Coloma, Michigan with the color terminology, other than the terminology expressed in common terms, in accordance with the Pantone Matching System (PMS) as used internationally to identify printed colors.

Botanical Classification: *Prunus persica* cultivar 'P.F. 11 Nectarine'

Tree:

Age – Twelve (12) years

Height – Unpruned 11'

Width – Unpruned 11'

Size – Medium

Vigor – Medium

Density – Medium

Form – Spreading to upright

Production – Good, requires heavy thinning

Bearer - Excellent

Disease resistance to bacterial leaf and fruit spot – Particularly resistant

Trunk:

Bark – Gray (405)

Size – Medium

Diameter – 5-1/4” diameter at 20” above the ground at 12 years of age

Surface – Semi-rough

Lenticels – Pronounced

Lenticels color – 471

Lenticels Size – 1/4”-3/8”

Branches:

Size - Medium - 2-1/4” diameter at 4” from trunk union

Surface – Semi- rough

Lenticels per square inch on branch - Usually six (6)

Lenticels color – 473

Lenticels Size – 1/8” – 1/4”

Crotch Angles – 85 degree angles

Branch color – Gray (423)

Internode Length – 3/4”

Leaves:

Size – 5-1/2” long – 1-1/2” wide

Color - Top of leaf 575, bottom of leaf 385

Form – Lanceolate

Thickness – Medium

Texture – Glabrous

Margin – Finely Serrate

Petiole length – 7/16"

Gland – approximately 2 on either side of the petiole and at basal part of the leaf

Gland color – Dark red

Gland shape – Cupped

Flower buds:

Size – ½" long - ¼" wide

Shape – Ovoid

Color – 217

Flowers:

Blooming period – April 23, 2003 to April 27, 2003

Bloom Size - 1-1/2" diameter

Size of Petals - ¾" long - ½" wide

Shape of Petals – Slightly cupped

Petal color – 250

Number of petals per flower – Five (5)

Sepal size – ¼" long - 3/16" wide

Sepal shape - Very slightly cupped

Sepal color – 384

Number of anthers – 28

Anther color – 131

Number of stamens – 28

Stamen length – 7/16"

Stamen color – 217

Pistil length – ½”

Pistil color – 102

Pollen – Present, self fertilizing

Flower color – 250

Flowers per cluster – 2-3

Fragrance – Very slight

Fruit:

Maturity when described – Full mature

Date of first picking – August 5, 2003

Date of last picking – August 10, 2003

Size – Average 2-1/2” diameter

Form – Oblate Sphere

Suture – Not pronounced

Weight – Average 6.9oz.

Skin:

Thickness – Medium

Texture – Tough, tenacious to skin

Tendency to crack – None

Down - None

Color – All red (187)

Flesh:

Texture- Firm

Ripens – Uniform

Aroma - Good

Eating Quality – Excellent

Color – Yellow (131)

Pit Cavity Color - yellow (136)

Stone:

Type – Freestone

Size – 1-5/16” long, 1-1/16” wide, 3/4” thick

Form – Ovid

Base – Straight

Apex – rounded but with a very sharp point

Sides – uneven

Surface – Furrowed

Color – Unusually light colored (155)

Tendency to crack – About 5%

Kernel - 5/8” long, 7/16” wide, 1/8” thick

Use: Desert

Shipping Quality: Very Good

Keeping Quality: Good

The tree and its fruit herein described may vary in slight detail as a result of differences in climatic or soil conditions or cultural practices under which the tree may be grown. It is to be understood that the description of the new variety as set forth herein is that of the tree grown under the ecological conditions prevailing at Coloma, Michigan.